
Hagerman Lake (Iron County, Michigan) Aquatic Invasive Species Monitoring Report

This is a product of biannual monitoring conducted on behalf of:

Hagerman Lake Property Owners' Association
Ryan Meske, President
Contact: Chad Johnson (Lake Steward Volunteer)

Prepared by:

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Date: 2022

INTRODUCTION

White Water Associates, Inc. has been retained by the Hagerman Lake Property Owners' Association to conduct biannual aquatic invasive species (AIS) monitoring in Hagerman Lake (Iron County, Michigan). White Water professional staff has had significant experience with the Hagerman Lake ecosystem having developed the 2018 Aquatic Plant Management Plan for Hagerman Lake and conducting AIS monitoring (even years) and water quality monitoring (odd years).

METHODS

For this survey, we conducted a thorough search of likely habitats for aquatic invasive species around the entire Hagerman Lake shoreline with special focus on the boat landings and other points of most likely introduction or colonization. The field work was conducted on July 1, 2022 by White Water aquatic biologist Angie Stine and field technician Sean Caron along with boat navigation assistance by Hagerman Lake steward Chad Johnson.

The search was conducted from a pontoon boat and began from the Johnson's home. Using the pontoon boat, we meandered searched around the entire lake and stopped at four target locations to look for AIS in the water and near shore. As part of the survey, a dredge was used at one location to collect a sediment sample to monitor for spiny water fleas. The survey ended by wading at the boat landing area looking for AIS. The shoreline in the vicinity of the boat landing was also walked looking for anything out of the ordinary.

SURVEY RESULTS

There were no Aquatic Invasive Species found at the four locations surveyed or the boat landing. During the meander search there were two invasive species the Pink Water Lily (46.05385; -88.78725) and the Aquatic Forget-Me-Not (46.07150; -88.78688). There are many irises present along the shoreline of Hagerman Lake and at the time of the survey we were able to see that they were the native Northern blue flag iris (*Iris versicolor*).

The Pink Water Lily was found at one location (Exhibit 1 and 3). This is an ornamental cultivar of the white water lily (they are the same species, *Nymphaea odorata*). It is invasive and future monitoring should determine the extent of this pink water lily in Hagerman Lake.



Exhibit 1. Pink Water Lily near shore at Hagerman Lake (floating leaves and blossom in red ellipse. Photo by White Water biologist, Angie Stine.



Exhibit 2. Aquatic Forget-me-not (within red ellipse). Photo by White Water Associates biologist, Angie Stine.

The Aquatic forget-me-not (*Myosotis scorpioides*) can quickly crowd plant species and is able to form large monocultures. This, in turn, affects community compositions by reducing the number of native herbs (WIDNR, 2020). Aquatic forget-me-not is difficult to control due to its mechanisms for spreading (WIDNR, 2020). Exhibit 2 is a photo and Exhibit 3 shows the locations of Aquatic forget-me-not.

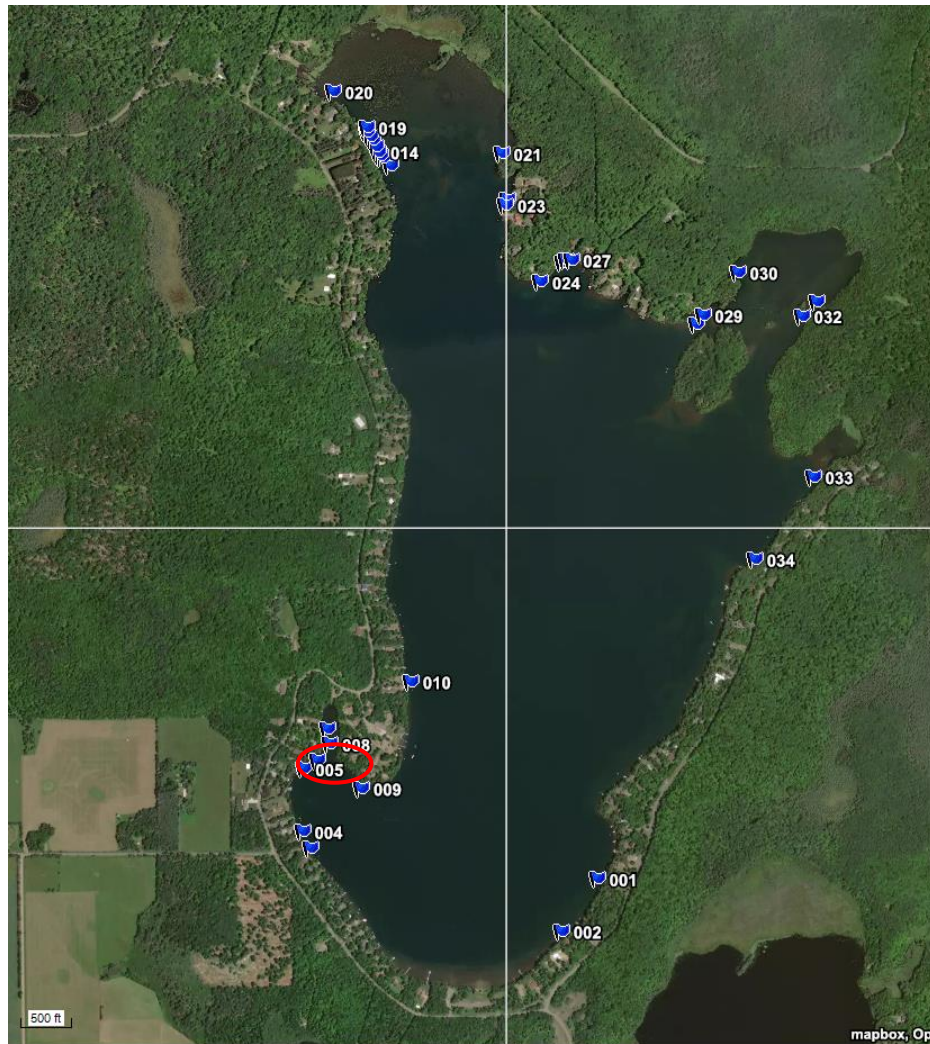
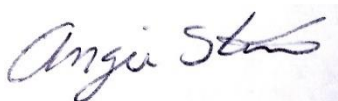


Exhibit 3. Aquatic Forget-Me-Not locations and the Pink Water Lily location (within red ellipse).

Spiny water fleas are an aquatic invasive zooplankton that is found in a few lakes in the Upper Peninsula and Northern Wisconsin. A way to determine if they are present in a lake is to conduct a vertical zooplankton tow at various locations in the lake and looking at the

sample to see if the tiny spiny water fleas are present or taking a dredge sample to collect sediment and look for the spines of the spiny water flea. A dredge sample was used in 2022 ((46.05353; W088.77859). The sample filtered and was examined under magnification in the lab and there were no invasive zooplankton in the sample collected.

We appreciate the opportunity to serve the Hagerman Lake Property Owners' Association. If there are any questions about this report or special need of services, please contact us at your convenience.



(Signature)

October 10, 2022

(Date)

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Literature Cited

Wisconsin Department of Natural Resources. 2020. *Aquatic Forget-Me-Not (Myosotis scorpioides)*. Retrieved 2020.

<<https://dnr.wisconsin.gov/topic/Invasives/fact/AquaticForgetMeNot.html>>